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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/046,710	01/17/2002	Yasumichi Kuwayama	Q68136	4857

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EXAMINER

NGUYEN, CHAU N

ART UNIT PAPER NUMBER

2831

DATE MAILED: 11/29/2002

Please find below and/or attached an Office communication concerning this application or proceeding.

# Office Action Summary

Application No.

10/046,710

Applicant(s)

KUWAYAMA ET AL.

Examiner

Chau N Nguyen

Art Unit

2831

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

## Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

## Status

- 1) ☒ Responsive to communication(s) filed on 18 October 2002.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

## Disposition of Claims

- 4) ☒ Claim(s) 1-11 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-11 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

## Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☒ The proposed drawing correction filed on 18 October 2002 is: a) ☒ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

## Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

## Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) \_\_\_\_\_.
- 4) ☐ Interview Summary (PTO-413) Paper No(s) \_\_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other:

## **DETAILED ACTION**

### ***Claim Rejections - 35 USC § 103***

1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

2. This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary.

Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

3. Claims 1, 2, 5 and 6 are rejected under 35 U.S.C. 103(a) as being unpatentable over Martin (3,143,595) in view of Wilcox (6,261,137).

Martin discloses a structure comprising a wire (not numbered) including a conductor portion and an insulating sheath, and a terminal (12) including a substantially cylindrical wire connection portion, wherein the conductor portion and the insulating sheath are inserted in the wire connection portion and are held in intimate contact with an inner peripheral surface of the wire connection portion. Martin does not specifically disclose the wire connection portion being pressed radially uniformly over an entire periphery thereof to hold the conductor portion and the insulating sheath in intimate contact.

Wilcox discloses a connecting structure wherein the wire connection portion of a terminal is pressed radially uniformly over an entire periphery to make electrical contact with a conductor portion of a wire (col. 3, lines 34-39). It would have been obvious to one skilled in the art to press the wire connection portion of Marint's terminal radially uniformly over the entire periphery as taught by Wilcox to hold the conductor portion and the insulating sheath tightly within the connection portion.

Re claim 2, Martin discloses the wire connection portion including a smaller-diameter insertion hole (20) for the conductor portion and a larger-diameter insertion hole for the insulating sheath (col. 3, lines 14-15), the smaller-

diameter and the larger-diameter insertion holes being disposed in coaxial relation to each other. Claims 5 and 6 are method counterparts of claims 1 and 2.

4. Claims 3, 4, 7 and 8 are rejected under 35 U.S.C. 103(a) as being unpatentable over Martin in view of Wilcox as applied to claims 1 and 5 above, and further in view of Reimert (4,830,408).

Reimert discloses a connector assembly comprising a terminal (114, Fig. 8) having a peripheral groove (146) in a connection portion for receiving a seal member (148), wherein the seal member is compressed in the peripheral groove when a sleeve (140) is inserted into the connection portion of the terminal to provide a seal between the terminal and the sleeve. Reimert also discloses the outer peripheral surface of the sleeve being held in intimate contact with the seal member (re claims 3 and 4).

It would have been obvious to one skilled in the art to provide the wire connection portion of Martin's terminal with a peripheral groove and a seal member as taught by Reimert so that when the insulating sheath is inserted in the wire connection portion, the outer peripheral surface of the sheath is held in intimate contact with the wire connection portion to provide a seal between the two

members. Noted that the modified structure of Martin is waterproof structure since it comprises structure and material as claimed.

Claims 7 and 8 are method counterparts of claims 3 and 4.

5. Claim 9 is rejected under 35 U.S.C. 103(a) as being unpatentable over Martin in view of Wilcox as applied to claim 5 above, and further in view of Churchill (3,934,333).

Churchill discloses an invention wherein a rotary swaging machine is used to press and reduce a cross-section of a wire. It would have been obvious to one skilled in the art to use the rotary swaging machine as taught by Churchill to press the wire connection portion of Martin to reduce the cross-section of the wire connection portion with a smooth outer surface.

### ***Claim Rejections - 35 USC § 102***

6. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in-

(1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effect under this subsection of a national application published under section 122(b) only if the international application designating the United States was published under Article 21(2)(a) of such treaty in the English language; or

(2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that a patent shall not be deemed filed in the United States for the purposes of this subsection based on the filing of an international application filed under the treaty defined in section 351(a).

7. Claims 1, 5 and 9-11 are rejected under 35 U.S.C. 102(e) as being anticipated by Murakami et al. (2002/0050385).

Murakami et al. discloses a structure for waterproofing a terminal-wire connecting portion, comprising a wire (15) including a conductor portion and an insulating sheath, and a terminal (11) including a substantially cylindrical wire connection portion (12), wherein the conductor portion and the insulating sheath are inserted in the wire connection portion, and the wire connection portion is pressed radially uniformly over an entire periphery thereof so that the conductor portion and the insulating sheath are held in intimate contact with an inner peripheral surface of the wire connection portion (re claim 1). Claim 5 is a method counterpart of claim 1. Murakami et al. also discloses the pressing being effected by a rotary swaging machine (re claim 9), the wire connection portion being pressed radially uniformly over an entire length thereof and over the entire periphery thereof (Fig. 7) (re claims 10 and 11).

***Response to Arguments***

8. Applicant's arguments with respect to claims 1, 5, and 9- 11 have been considered but are moot in view of the new ground(s) of rejection except for the following.

Applicant argues that Wilcox does not teach or suggest the connector being pressed radially uniformly over the entire periphery of the connector. This argument is not found persuasive. As shown in Figures 4 and 5 of Wilcox, the upper semicircle (125) and the lower semicircle (130), etc. the entire periphery of the connector, are pressed radially and uniformly. If the connector of Wilcox as shown in Figure 4 was not radially and uniformly pressed, then the central bore (115) would not have a uniform reduced diameter as shown in Figure 5.

***Summary***

9. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is



filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

### ***Communication***

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Chau N Nguyen whose telephone number is 308-0693. The examiner can normally be reached on Mon-Fri.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Dean Reichard can be reached on (703) 308 3682. The fax phone numbers for the organization where this application or proceeding is assigned are (703) 308 3431 for regular communications and (703) 305 1341 for After Final communications.

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Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-0956.



Chau N Nguyen  
Primary Examiner  
Art Unit 2831

CN  
November 20, 2002